



UNITED STATES PATENT AND TRADEMARK OFFICE

82

UNITED STATES DEPARTMENT OF COMMERCE
United States Patent and Trademark Office
Address: COMMISSIONER FOR PATENTS
P.O. Box 1450
Alexandria, Virginia 22313-1450
www.uspto.gov

APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/655,831	09/05/2003	Alfred V. Alasia	62770.000068	7155
7590	01/26/2005			EXAMINER
J. Michael Martinez de Andino, Esq. HUNTON & WILLIAMS Riverfront Plaza, East Tower 951 E. Byrd Street Richmond, VA 23219-4074			LEMMA, SAMSON B	
			ART UNIT	PAPER NUMBER
			2132	
			DATE MAILED: 01/26/2005	

Please find below and/or attached an Office communication concerning this application or proceeding.

Office Action Summary	Application No.	Applicant(s)	
	10/655,831	ALASIA ET AL.	
	Examiner Samson B Lemma	Art Unit 2132	

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) Responsive to communication(s) filed on 05 September 2003.
- 2a) This action is FINAL. 2b) This action is non-final.
- 3) Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) Claim(s) 1-55 is/are pending in the application.
- 4a) Of the above claim(s) _____ is/are withdrawn from consideration.
- 5) Claim(s) _____ is/are allowed.
- 6) Claim(s) 1-55 is/are rejected.
- 7) Claim(s) _____ is/are objected to.
- 8) Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

- 9) The specification is objected to by the Examiner.
- 10) The drawing(s) filed on _____ is/are: a) accepted or b) objected to by the Examiner.
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

- 12) Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) All b) Some * c) None of:
1. Certified copies of the priority documents have been received.
 2. Certified copies of the priority documents have been received in Application No. _____.
 3. Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

- 1) Notice of References Cited (PTO-892)
- 2) Notice of Draftsperson's Patent Drawing Review (PTO-948)
- 3) Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08)
Paper No(s)/Mail Date 3/5/2004.
- 4) Interview Summary (PTO-413)
Paper No(s)/Mail Date. _____.
- 5) Notice of Informal Patent Application (PTO-152)
- 6) Other: _____.

DETAILED ACTION

1. **Claims 1-55** have been examined.

Claim Rejections - 35 USC § 102

2. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.

3. **Claims 1,8-9,10,13,27,34-35, 41 ,48,51-52,55** are rejected under 35 U.S.C. 102 (b) as being anticipated by Huang et al. (hereinafter referred to as **Huang**) (U.S. Publication Number: 2002/0054680)

4. **As per claims 1,13,27 ,41,51-52 and 55** Huang discloses an authenticatable article comprising:

- A printable surface; [Page 1, reference ‘[0001]’ and “[0002]”]
- A latent image formed on a first portion of the printable surface in a transmittent printing medium, the latent image being an encoded version of an authentication image and being configured for optical decoding by an optical decoder so that the authentication image can be viewed through the optical

decoder when the optical decoder is placed over the latent image.[Page 1, reference “[0003]”, reference “[0011]” and reference “[0013]”; page 4, reference “[0057]” and “abstract”]

5. **As per claims 8,34,35** Huang discloses an authenticatable article as applied to claims 1 and 27 above. Furthermore Huang discloses an authenticatable article wherein wherein the line frequency is selected to match a lens frequency of the decoder within about plus or minus 10 lines/inch.[Page 4, reference “[0057]”]

6. **As per claims 9, 10 and 48** Huang discloses an authenticatable article as applied to claims 1 and 41 above. Furthermore Huang discloses an authenticatable article wherein a visible primary image formed on a second portion of the printable surface. .[Page 1, reference “[0003]”, reference “[0011]” and reference “[0013]” and “abstract”)

Claim Rejections - 35 USC § 103

7. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negatived by the manner in which the invention was made.

8. **Claims 2-5,11-12,14-17,28-31,42-45,49-50** are rejected under 35 U.S.C. 103(a) as being unpatentable over by Huang et al. (hereinafter referred to as **Huang**) (U.S. Publication Number: 2002/0054680) in view of **Amon** et al (hereinafter refereed as **Amon**) (U.S. Publication 2003/0136837)

9. **As per claims 2,3,11-12,14-15,28-29,42-43,49-50** Huang discloses an authenticatable article comprising:
- A printable surface; [Page 1, reference '[0001]' and "[0002]"]
 - A latent image formed on a first portion of the printable surface in a transmittent printing medium, the latent image being an encoded version of an authentication image and being configured for optical decoding by an optical decoder so that the authentication image can be viewed through the optical decoder when the optical decoder is placed over the latent image.[Page 1, reference "[0003]", reference "[0011]" and reference "[0013]"; page 4, reference "[0057]" and "abstract")

Huang does not explicitly teach

- an authenticatable article wherein the transmittent printing medium is selected to provide a maximum reflectivity difference between the first portion of the printable surface with the latent image printed thereon and an adjacent area of the printable surface, the maximum reflectivity difference being no greater than 5% of the reflectivity of the adjacent area.

However, In the same field of endeavor, **Amon discloses**

Particularly useful for identity documents, the security marking is a random-pattern of optically authenticate-able flakes or particles, applied over a printed micro-text. Said random-pattern of particles is produced by over-coating said printed document, at least in part, with a clear varnish containing said optically authenticate-able particles in an appropriate concentration. Said over-coating varnish may have additionally a protecting function, and said optically authenticate-able particles may have particular optical characteristics, such as

spectrally selective reflectivity, angle-dependent color appearance, luminescence, polarization, etc.[Page 5, reference “[0087]”)

It would have been obvious to one having ordinary skill in the art, at the time the invention was made, to combine the features of selective reflectivity for the purpose of authentication as per teachings of **Amon** into the method taught by **Huang** in order to avoid detection and enhances authentication.

10. As per claims 4-5,16-17,30-31,44-45 Huang discloses an authenticatable article comprising:

- A printable surface; [Page 1, reference ‘[0001]’ and “[0002]”]
- A latent image formed on a first portion of the printable surface in a transmittent printing medium, the latent image being an encoded version of an authentication image and being configured for optical decoding by an optical decoder so that the authentication image can be viewed through the optical decoder when the optical decoder is placed over the latent image.[Page 1, reference “[0003]”, reference “[0011]” and reference “[0013]”; page 4, reference “[0057]” and “abstract”]

Huang does not explicitly teach that the transmittent printing medium comprises a clear printer's varnish.

However, In the same field of endeavor, **Amon discloses** Particularly useful for identity documents, the security marking is a random-pattern of optically authenticate-able flakes or particles, applied over a printed micro-text. Said random-pattern of particles is produced by over-coating said printed document, at least in part, with a clear varnish containing said optically

authenticate-able particles in an appropriate concentration.[Page 5, reference “[0087]”]

It would have been obvious to one having ordinary skill in the art, at the time the invention was made, to combine the features of using clear varnish as per teachings of **Amon** into the method taught by **Huang** in order to have small variations in reflectivity of the substrata that do not change over time.

11. **Claims 6-7,18-19,32-33,46-47,53-54,** are rejected under 35 U.S.C. 103(a) as being unpatentable over by Huang et al. (hereinafter referred to as **Huang**) (U.S. Publication Number: 2002/0054680) in view of **Merry** et al (hereinafter referred as **Merry**) (U.S. Patent No: 5,178,418)

12. **As per claims 6-7,18-19,32-33,46-47,53-54,** **Huang** discloses an authenticatable article comprising:

- A printable surface; [Page 1, reference ‘[0001]’ and “[0002]”]
- A latent image formed on a first portion of the printable surface in a transmittent printing medium, the latent image being an encoded version of an authentication image and being configured for optical decoding by an optical decoder so that the authentication image can be viewed through the optical decoder when the optical decoder is placed over the latent image.[Page 1, reference “[0003]”, reference “[0011]” and reference “[0013]”; page 4, reference “[0057]” and “abstract”]

Huang does not explicitly teach the latent image comprises a plurality of parallel lines printed with a line frequency in a range of about 50 lines/inch to about 150 lines/inch.

However, In the same field of endeavor, **Merry discloses**

Art Unit: 2132

The latent image within the printed character array, according to the foregoing, is viewable by overlaying the array with a lenticular finding screen comprising a set of convex plano-cylindrical lenses having the same line (or column) frequency as the character strings. When the lenses are aligned parallel to the character strings, the latent image is viewed at a slightly different angle than the array due to refraction. [Column 3, lines 49-51]

It would have been obvious to one having ordinary skill in the art, at the time the invention was made, to combine the features having latent image comprises a plurality of parallel lines printed with a line frequency as per teachings of **Merry** into the method taught by **Huang** for the purpose of authenticating the object.

13. **As per claims 21,20 the combinations of Huang and Merry** discloses an authenticatable article as applied to claim 19 above. Furthermore **Huang** discloses an authenticatable article as applied to claims 1 and 27 above. Furthermore Huang discloses an authenticatable article wherein wherein the line frequency is selected to match a lens frequency of the decoder within about plus or minus 10 lines/inch.[Page 4, reference “[0057]”]

14. **Claims 36-40,** are rejected under 35 U.S.C. 103(a) as being unpatentable over by Huang et al. (hereinafter referred to as **Huang**) (U.S. Publication Number: 2002/0054680) in view of Kolesar et. al (hereinafter refereed as **Kolesar et al**) (U.S. Patent No: 6,177,683)

15. **As per claims 36-40 Huang** discloses an authenticatable article comprising:

- A printable surface; [Page 1, reference ‘[0001]’ and “[0002]”]

Art Unit: 2132

- A latent image formed on a first portion of the printable surface in a transmittent printing medium, the latent image being an encoded version of an authentication image and being configured for optical decoding by an optical decoder so that the authentication image can be viewed through the optical decoder when the optical decoder is placed over the latent image.[Page 1, reference “[0003]”, reference “[0011]” and reference “[0013]”; page 4, reference “[0057]” and “abstract”]

Huang does not explicitly teach the lenticular lens comprises an anti-reflective coating on at least one of the upper, viewer-facing surface and the lower, image-facing surface.

However, In the same field of endeavor, **Kolesar discloses**

That both the lens and the kinoform have an anti-reflective coating to reduce glare. [Column 4, lines 20-21]

It would have been obvious to one having ordinary skill in the art, at the time the invention was made, to combine the features having anti-reflective coating as per teachings of Kolesar into the method taught by **Huang** for the purpose of reducing the glare.

16. **Claims 21-26,** are rejected under 35 U.S.C. 103(a) as being unpatentable over by Huang et al. (hereinafter referred to as **Huang**) (U.S. Publication Number: 2002/0054680) in view of Merry et al (hereinafter referred as **Merry**) (U.S. Patent No: 5,178,418) further in view of Kolesar et. al (hereinafter referred as **Kolesar et al**) (U.S. Patent No: 6,177,683)

17. **As per claims 21-26 the combination of Huang and Merry discloses an authenticatable article comprising:**

- A printable surface; [Page 1, reference ‘[0001]’ and “[0002]”]

Art Unit: 2132

- A latent image formed on a first portion of the printable surface in a transmittent printing medium, the latent image being an encoded version of an authentication image and being configured for optical decoding by an optical decoder so that the authentication image can be viewed through the optical decoder when the optical decoder is placed over the latent image.[Page 1, reference “[0003]”, reference “[0011]” and reference “[0013]”; page 4, reference “[0057]” and “abstract”]

The combination of Huang and Merrydoes not explicitly teach the lenticular lens comprises an anti-reflective coating on at least one of the upper, viewer-facing surface and the lower, image-facing surface.

However, In the same field of endeavor, **Kolesar discloses**

That both the lens and the kinoform have an anti-reflective coating to reduce glare.[Column 4, lines 20-21]

It would have been obvious to one having ordinary skill in the art, at the time the invention was made, to combine the features having anti-reflective coating as per teachings of Kolesar into the method taught by **Huang** for the purpose of reducing the glare.

Conclusion

18. The prior art made of record and not relied upon is considered pertinent to applicant's disclosure. (See PTO-Form 892).

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Samson B Lemma whose telephone number is 571-272-3806. The examiner can normally be reached on Monday-Friday (8:00 am---4: 30 pm).

Art Unit: 2132

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, BARRON JR GILBERTO can be reached on. The fax phone number for the organization where this application or proceeding is assigned is 571-272-3799.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

SAMSON LEMMA

THOMAS R. PEESO
PRIMARY EXAMINER

S.L

01/21/2005